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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/506,336

09/02/2004

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EXAMINER

SAMPLE, DAVID R

ART UNIT

PAPER NUMBER

1755

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
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3 MONTHS

03/20/2007

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

## Office Action Summary

Application No.

10/506,336

Applicant(s)

TATSUMI ET AL.

Examiner

David Sample

Art Unit

1755

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 02 September 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-34 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-7 and 28-34 is/are rejected.
- 7) ☒ Claim(s) 3, 5-28 and 31-34 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date 20040902.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_.

## **DETAILED ACTION**

### ***Claim Objections***

Claims 5-8, 10-12, 15-28, 31-34 are objected to under 37 CFR 1.75(c) as being in improper form because a multiple dependent claim may not depend from another multiple dependent claim. See MPEP § 608.01(n). The claims have been further treated on the merits, but failure to correct the deficiency will result in the claims being removed from consideration.

Claim 3 is objected to under 37 CFR 1.75(c), as being of improper dependent form for failing to further limit the subject matter of a previous claim. Applicant is required to cancel the claim(s), or amend the claim(s) to place the claim(s) in proper dependent form, or rewrite the claim(s) in independent form.

Claim 3 depends from claim 2 but is identical in scope to claim 2.

### ***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

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Claims 1-7 rejected under 35 U.S.C. 102(a) as being anticipated by Wu et al. ("A Novel Titanosilicate with MWW Structure. I. Hydrothermal Synthesis, Elimination of Extraframework Titanium, and Characterizations," *J. Phys. Chem. B*, v. 105, 2001, 2897-2905).

Wu et al. discloses a titanosilicate having an IR peak at  $930\text{ cm}^{-1}$ . See the "Experimental Section" on page 2898, Figure 8 and paragraph bridging the columns on page 2903. The compositional recitations of instant claims 1 and 7 can be found in Wu et al. in Table 1.

The recitations of claims 2-5 appear to be present in Figure 8 of the reference.

The recitations of claim 6 can be found in the reference in Figure 1.

Claims 1-7 and 28-34 are rejected under 35 U.S.C. 102(e) as being anticipated by Oguchi et al. (US Patent No. 6,759,540).

Oguchi et al. qualifies as prior art under 102(e) with an effective filing date of November 14, 2000. See the flow chart in MPEP 706.02(f)(1).

Oguchi et al. discloses a titanosilicate having a composition meeting the recitations of instant claims 1 and 7. See col. 4, lines 60-63.

The reference fails to disclose that the titanosilicate has an IR peak at  $930 \pm 15\text{ cm}^{-1}$  or the other IR properties recited in claims 2-5. However, Oguchi et al. discloses that the titanosilicate is made by a process by crystallizing a reaction mixture containing sources of titanium, boron, and silicon and subsequently acid treating the silicate to remove the boron. See col. 17, Example 1, lines 5-60. Wu et al.<sup>1</sup> discloses that an MWW titanosilicate made by such a route has an IR peak at  $930\text{ cm}^{-1}$ . See the "Experimental Section" on page 2898, and paragraph

bridging the columns on page 2903. For these reasons, the titanasilicate of Oguchi et al. is presumed to inherently possess the claimed IR absorbance. See MPEP 2112. (It should be noted that a second reference can be employed in an anticipation rejection to show that a particular characteristic is inherent. MPEP 2131.01 III.)

The recitations of instant claim 6 can be found in Oguchi et al. at col. 7, lines 34-45.

The recitations of instant claims 28-34 can be found in the reference at col. 11, line 61, to col. 14, line 16.

The applied reference has common inventors with the instant application. Based upon the earlier effective U.S. filing date of the reference, it constitutes prior art under 35 U.S.C. 102(e). This rejection under 35 U.S.C. 102(e) might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the reference was derived from the inventor of this application and is thus not the invention "by another," or by an appropriate showing under 37 CFR 1.131.

#### ***Allowable Subject Matter***

Claims 8-27 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The prior art fails to disclose or suggest a method of making a titanasilicate having the claim IR characteristics by heating a mixture of a boron source, a silicon source and template, to

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<sup>1</sup> Wu et al., "A Novel Titanasilicate with MWW Structure. I. Hydrothermal Synthesis, Elimination of Extraframework Titanium, and Characterizations," *J. Phys. Chem. B*, v. 105, 2001, 2897-2905.

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form a precursor, acid treating the precursor, and heating the acid treated precursor in the presence of a mixture of a titanium compound and template.

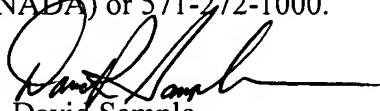
### *Conclusion*

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to David Sample whose telephone number is (571)272-1376. The examiner can normally be reached on Monday to Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jerry Lorengo can be reached on (572)272-1233. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

  
David Sample  
Primary Examiner  
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